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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/732,293	12/08/2000	Timo Hanninen	59643.00657	2672

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TYSONS CORNER, VA 22182

EXAMINER

HSU, ALPUS

ART UNIT	PAPER NUMBER
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2616

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
3 MONTHS	02/28/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

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Office Action Summary	Application No.	Applicant(s)	
	09/732,293	HANNINEN ET AL.	
	Examiner	Art Unit	
	Alpus H. Hsu	2616	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 03 January 2007.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 23-42 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 23-42 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

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1. Applicant's arguments with respect to claims 23-42 have been considered but are moot in view of the new ground(s) of rejection.

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

4. Claims 23-42 are rejected under 35 U.S.C. 103(a) as being unpatentable over BLACK in WO 99/53700 (of record), hereinafter referred to as BLACK, in view of ALPEROVICH et al. in U.S. Patent No. 5,940,763 A, hereinafter referred to as ALPEROVICH.

Referring to claim 23, BLACK discloses a network for communicating with a plurality of radiotelephones (46s) via respective communication channels over a carrier, wherein the channels can operate at a first or second data rate such that the carrier can transmit a single communication channel operating at the first data rate or two communication channels operating at the second data rate (page 13, lines 19-23), the network comprising a controller (38 and/or 42)

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responsive to a channel request and handover decision to generate a command for a change in the data rate of a transmitted channel from the first data rate to the second data rate (page 11, line 23 to page 12, line 10).

BLACK differs from the claim, in that, it does not disclose an initiation of a call with a second network for initiating a change in the data rate of a transmitted channel. However, BLACK does disclose the controller interfaces with other controllers and/or other telecommunications networks via a gateway mobile switching center (page 6, lines 15-25). It is also well known in the art to initiate a call connection between two subscribers in two different networks which involves the data rate change for congestion control.

ALPEROVICH, for example, from the similar field of endeavor, teaches the initiation of a call between two subscribers for initiating a change in the data rate of a transmitted channel from full rate to half rate (col. 2, lines 20-41, col. 6, line 35 to col. 8, line 67) to effectuate a new call connection between two subscribers to increase the call capacity when congested.

Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate the feature of initiation of a channel between subscribers in different networks as in ALPEROVICH for initiating a change in the data rate of a transmitted channel when necessary to further improve the system call capacity and transmission efficiency.

Referring to claim 24, BLACK discloses the communication channels are timeslots on the carrier (page 8, lines 10-11).

Referring to claim 25, BLACK discloses that the channels can operate at a first or second data rate such that a timeslot on the carrier can transmit a single communication channel

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operating at the first data rate or two communication channels operating at the second data rate (page 8, lines 15-17).

Referring to claims 26 and 27, BLACK discloses the controller is responsive to the initiation of a channel with the second network for initiating a change in the data rate of two channels transmitted on separate timeslots from the first data rate to the second data rate and combining the two channels onto the same timeslot and the first data rate is a full speech rate and the second data rate is a half speech rate (page 8, lines 7-22)

Referring to claim 28, BLACK discloses that the controller is responsive to the number of channels established in the network exceeding a predetermined threshold for initiating a change in the data rate of the transmitted channel from the first data rate to the second data rate (page 9, lines 3-24, page 10, line 25 to page 11, line 22, page 13, lines 3-16).

Referring to claim 29, BLACK discloses that the change of data rate of a transmitted channel is performed for a connection between subscribers within the network (page 10, lines 19-20).

Referring to claims 30 and 42, BLACK discloses a controller (38 and/or 42) for operation in a network wherein the network communicates with a plurality of radiotelephones (46s) via respective communication channels over a carrier, the channels being operable at a first or second data rate such that the carrier can transmit a single communication operating at the first data rate or two communication channels operating at the second data rate (page 13, lines 19-23).

BLACK differs from the claim, in that, it does not disclose an initiation of a call with a second network for initiating a change in the data rate of a transmitted channel. However, BLACK does disclose the controller interfaces with other controllers and/or other

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telecommunications networks via a gateway mobile switching center (page 6, lines 15-25). It is also well known in the art to initiate a call connection between two subscribers in two different networks which involves the data rate change for congestion control.

ALPEROVICH, for example, from the similar field of endeavor, teaches the initiation of a call between two subscribers for initiating a change in the data rate of a transmitted channel from full rate to half rate (col. 2, lines 20-41, col. 6, line 35 to col. 8, line 67) to effectuate a new call connection between two subscribers to increase the call capacity when congested.

Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate the feature of initiation of a channel between subscribers in different networks as in ALPEROVICH for initiating a change in the data rate of a transmitted channel when necessary to further improve the system call capacity and transmission efficiency.

Referring to claim 31, BLACK discloses the communication channels are timeslots on the carrier (page 8, lines 10-11).

Referring to claim 32, BLACK discloses that the channels can operate at a first or second data rate such that a timeslot on the carrier can transmit a single communication channel operating at the first data rate or two communication channels operating at the second data rate (page 8, lines 15-17).

Referring to claims 33 and 34, BLACK discloses the controller is responsive to the initiation of a channel with the second network for initiating a change in the data rate of two channels transmitted on separate timeslots from the first data rate to the second data rate and combining the two channels onto the same timeslot and the first data rate is a full speech rate and the second data rate is a half speech rate (page 8, lines 7-22)

Referring to claim 35, BLACK discloses that the controller is responsive to the number of channels established in the network exceeding a predetermined threshold for initiating a change in the data rate of the transmitted channel from the first data rate to the second data rate (page 9, lines 3-24, page 10, line 25 to page 11, line 22, page 13, lines 3-16).

Referring to claim 36, BLACK discloses that the change of data rate of a transmitted channel is performed for a connection between subscribers within the network (page 10, lines 19-20).

Referring to claim 37, BLACK discloses a radiotelephone (46) for operation with a network which initiates a change in data rate of a channel from a first data rate to a second data rate in response to a channel request and handover decision (page 11, line 23 to page 12, line 10), comprising a controller (92) responsive to a signal from the network for changing the data rate of data being transmitted on a channel from a radiotelephone.

BLACK differs from the claim, in that, it does not disclose an initiation of a call with a second network for initiating a change in the data rate of a transmitted channel. However, BLACK does disclose the controller interfaces with other controllers and/or other telecommunications networks via a gateway mobile switching center (page 6, lines 15-25). It is also well known in the art to initiate a call connection between two subscribers in two different networks which involves the data rate change for congestion control.

ALPEROVICH, for example, from the similar field of endeavor, teaches the initiation of a call between two subscribers for initiating a change in the data rate of a transmitted channel from full rate to half rate (col. 2, lines 20-41, col. 6, line 35 to col. 8, line 67) to effectuate a new call connection between two subscribers to increase the call capacity when congested.

Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate the feature of initiation of a channel between subscribers in different networks as in ALPEROVICH for initiating a change in the data rate of a transmitted channel when necessary to further improve the system call capacity and transmission efficiency.

Referring to claim 38, BLACK discloses a method of communicating with a plurality of radiotelephones (46s) via respective communication channels over a carrier, wherein the channels can operate at a first or second data rate such that the carrier can transmit a single communication channel operating at the first data rate or two communication channels operating at the second data rate (page 13, lines 19-23).

BLACK differs from the claim, in that, it does not disclose an initiation of a call with a second network for initiating a change in the data rate of a transmitted channel. However, BLACK does disclose the controller interfaces with other controllers and/or other telecommunications networks via a gateway mobile switching center (page 6, lines 15-25). It is also well known in the art to initiate a call connection between two subscribers in two different networks which involves the data rate change for congestion control.

ALPEROVICH, for example, from the similar field of endeavor, teaches the initiation of a call between two subscribers for initiating a change in the data rate of a transmitted channel from full rate to half rate (col. 2, lines 20-41, col. 6, line 35 to col. 8, line 67) to effectuate a new call connection between two subscribers to increase the call capacity when congested.

Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate the feature of initiation of a channel between subscribers in different

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networks as in ALPEROVICH for initiating a change in the data rate of a transmitted channel when necessary to further improve the system call capacity and transmission efficiency.

Referring to claim 39, BLACK discloses the communication channels are timeslots on the carrier (page 8, lines 10-11).

Referring to claim 40, BLACK discloses the channels can operate at a first or second data rate such that a timeslot on the carrier can transmit a single communication channel operating at the first data rate or two communication channels operating at the second data rate (page 8, lines 15-17).

Referring to claim 41, BLACK discloses that in response to the predetermined condition initiating a change in the data rate of two channels transmitted on separate timeslots from the first data rate to the second data rate and combining the two channels onto the same timeslot (page 8, lines 7-22).

5. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

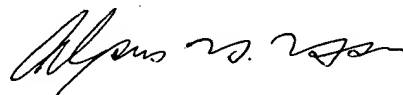
Galyas et al. is additionally cited to show the common feature of multi-rate radio communication system utilizing rate adaptation unit for switching between different data rates during handover similar to the claimed invention.

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Alpus H. Hsu whose telephone number is (571)272-3146. The examiner can normally be reached on M-F (5:30-3:00) First Friday Off.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Wellington Chin can be reached on (571)272-3134. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



AHH

Alpus H. Hsu
Primary Examiner
Art Unit 2616